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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/755,798	01/12/2004	Susan Legault	706718US1	9383
24938	7590	05/03/2005		
DAIMLERCHRYSLER INTELLECTUAL CAPITAL CORPORATION			EXAMINER	
CIMS 483-02-19			WEST, JEFFREY R	
800 CHRYSLER DR EAST			ART UNIT	
AUBURN HILLS, MI 48326-2757			PAPER NUMBER	
			2857	

DATE MAILED: 05/03/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

EK

**Office Action Summary**

Application No.

10/755,798

Applicant(s)

LEGAULT ET AL.

Examiner

Jeffrey R. West

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
 Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 12 January 2004.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 1-21 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-21 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☒ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 12 January 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
 Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
 Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- |  |   |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)  | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)                                   | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152)             |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)<br>Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____  |

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## **DETAILED ACTION**

### ***Specification***

1. The disclosure is objected to because of the following informalities:

On page 3, paragraph 0013, line 1, "block diagram" should be ---flow chart---.

On page 5, paragraph 0021, line 2, reference is made to "the first entity 16" while Figure 1 illustrates the "first entity" as "18".

On page 6, paragraph 0023, line 8, "Figure 3" should be ---Figures 3A and 3B---.

Page 8, paragraph 0028, lines 1-2, indicate that "[a]t step 104, the first entity 18 performs the first step 12 of the method 100 and gathers data", while Figure 7 shows step 12 being performed before step 104.

On page 8, paragraph 0028, line 2, reference is made to "the method 100" while Figure 1 illustrates "the method" as "10".

On pages 8-9, paragraph 0029, lines 5, 10, 14, and 18, reference is made to the "failure mode and effects analysis" as step "14" while Figure 1 illustrates the "failure mode and effects analysis" step as "16".

Appropriate correction is required.

### ***Claim Objections***

2. Claims 8, 9, 17, and 18 are objected to because of the following informalities:

In claim 8, line 3, to avoid problems of antecedent basis, "severity" should be ---severity associated with each potential failure---.

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In claim 8, line 4, to avoid problems of antecedent basis, "the order" should be ---  
an order---.

In claim 9, line 1, to avoid problems of antecedent basis, "severity" should be ---  
severity associated with each potential failure---.

In claim 17, line 3, to avoid problems of antecedent basis, "severity" should be ---  
severity associated with each potential failure---.

In claim 17, line 4, to avoid problems of antecedent basis, "the order" should be --  
-an order---.

In claim 18, line 1, to avoid problems of antecedent basis, "severity" should be ---  
severity associated with each potential failure---.

Appropriate correction is required.

***Claim Rejections - 35 USC § 112***

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claims 1-21 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

The term "similar" in claim 1 is a relative term which renders the claim indefinite. The term "similar" is not defined by the claim, the specification does not provide a standard for ascertaining the requisite degree, and one of ordinary skill in the art would not be reasonably apprised of the scope of the invention. Specifically, one

having ordinary skill in the art would not understand what type of process is considered to be "similar" to an intended process since the term "similar" has a wide variety of definitions in the art of processes.

Claim 13 is considered to be vague and indefinite because it attempts to further limit "the severity" by carrying out a ranking operation to "the severity". There is no previous mention of any "severity", however, and therefore it is unclear to one having ordinary skill in the art as to what data "the severity" refers.

Claims 2-12 and 14-21 are rejected under 35 U.S.C. 112, second paragraph, because they incorporate the lack of clarity present in their respective parent claims.

### ***Claim Rejections - 35 USC § 101***

5. 35 U.S.C. 101 reads as follows:

Whoever invents or discovers any new and useful process, machine, manufacture, or composition of matter, or any new and useful improvement thereof, may obtain a patent therefor, subject to the conditions and requirements of this title.

6. Claims 1-21 are rejected under 35 U.S.C. 101 because the claimed invention is directed to non-statutory subject matter.

35 U.S.C. 101 requires that the claimed invention as a whole must accomplish a practical application. That is, it must produce a "useful, concrete and tangible result." *State Street*, 149 F.3d at 1373, 47 USPQ2d at 1601-02. The purpose of this requirement is to limit patent protection to inventions that possess a certain level of "real world" value, as opposed to subject matter that represents nothing more than an idea or concept, or is simply a starting point for future investigation or research

(Brenner v. Manson, 383 U.S. 519, 528-36, 148 USPQ 689, 693-96); In re Ziegler, 992, F.2d 1197, 1200-03, 26 USPQ2d 1600, 1603-06 (Fed. Cir. 1993)).

It has also been held that a process that consists solely of the manipulation of an abstract idea is not concrete or tangible. See In re Warmerdam, 33 F.3d 1354, 1360, 31 USPQ2d 1754, 1759 (Fed. Cir. 1994). See also Schrader, 22 F.3d at 295, 30 USPQ2d at 1459.

The instant invention provides a non-computer implemented method for gathering data by a first person or group of persons to identify potential failures for further ranking by a second person or group of persons. This gathering of data and production of an end result of a ranked list of potential failures is only a starting point for any implementation of the ranked list and is furthermore merely the manipulation of abstract ideas and not considered to produce a concrete and tangible result.

### ***Claim Rejections - 35 USC § 103***

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claims 1-21 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Patent Application Publication No. 2004/0225475 to Johnson et al. in view of U.S. Patent No. 6,643,592 to Loman et al.

With respect to claims 1 and 13, Johnson discloses a method for performing a failure mode and effects analysis on an intended process (0030, lines 30-36) comprising gathering data relating to failures occurring in the process (0026, lines 1-8), identifying potential failures in the intended process by a first entity based on the gathered data (0023, lines 11-14), and performing a failure mode and effects analysis on the intended process by a second entity based on the potential failures identified by the first entity (0023, lines 18-26).

With respect to claims 5 and 14, Johnson discloses that the step of identifying potential failures comprises quantifying a severity associated with each potential failure, by the first entity (0023, lines 14-16).

With respect to claims 6 and 15, Johnson discloses that the step of performing a failure mode and analysis further comprises quantifying an occurrence ranking associated with each potential failure (0022, lines 5-8).

With respect to claims 7 and 16, Johnson discloses that the step of performing a failure mode and analysis further comprises quantifying a detection ranking associated with each potential failure (0022, lines 8-10).

With respect to claims 8 and 17, Johnson discloses calculating a risk priority number from the severity, occurrence ranking, and detection ranking, to rank the order in which the potential failures will be corrected (0022, lines 22-24 and 0024).

With respect to claims 9 and 18, Johnson disclose that the severity, occurrence ranking, and detection ranking are quantified using scoring guidelines proved by the

first entity (i.e. numerical scoring as determined by the first entity) (0022 and Figure 5).

With respect to claims 10, 11, 19, and 20, Johnson discloses that the second entity is larger than the first entity and at least partially comprises the first entity (i.e. the second entity includes the experts of the individual first entities and at least an additional owner (0023, line 18 to 0024, line 8).

With respect to claims 12 and 21, Johnson discloses identifying factors (i.e. severity, occurrence detectability, maintainability, etc.) associated with each identified potential failure (0022).

As noted above, the invention of Johnson teaches many of the features of the claimed invention and while Johnson does disclose gathering data related to failures occurring in the process, Johnson does not explicitly state that the data be gathered from a similar process and/or by interviewing workers associated with the process.

Loman teaches a system and method for fault diagnosis comprising a first entity that gathers data from (i.e. at the location of) a similar process/machine as well as information obtained by interviewing workers associated with the process/machine and, using such information, attempts to determine a potential fault (column 3, lines 49-55).

It would have been obvious to one having ordinary skill in the art to modify the invention of Johnson to explicitly state that the data be gathered from a similar process and/or by interviewing workers associated with the process, as taught by Loman, because Loman suggests that the combination would have improved the



diagnosis and any repair of the machine/process by allowing the first entity to use a wider variety of information including past experiences with the machine/process to determine any potential problems (column 1, lines 41-51) as well as information from those most readily exposed to the machine/process operation (column 3, lines 49-55). Further, one having ordinary skill in the art would understand that the prediction of potential faults in one process would be improved by obtaining data from a similar process since both processes will contain similar parts and undergo similar conditions.

With respect to claim 4, since the invention of Johnson discloses that the step of gathering data further comprises reviewing previous failure mode effect analysis performed on the process and stored in a FMEA database (0021) and Loman teaches the step of gathering data from a similar process/machine ((column 3, lines 49-55), the combination teaches that the step of gathering data further comprises reviewing previous failure mode effect analysis performed on the similar process.

### ***Conclusion***

9. The prior art made of record and not relied upon is considered pertinent to Applicant's disclosure.

U.S. Patent Application Publication No. 2004/0128108 to Cutuli et al. teaches design failure mode effect analysis including the step of identifying potential failures comprising quantifying a severity associated with each potential failure, quantifying an occurrence ranking associated with each potential failure, quantifying a detection

ranking associated with each potential failure and calculating a risk priority number from the severity, occurrence ranking, and detection ranking.

U.S. Patent Application Publication No. 2003/0004765 to Wiegand teaches a method and apparatus for optimizing equipment maintenance.

U.S. Patent Application Publication No. 2003/0171897 to Bieda et al. teaches a product performance integrated database apparatus and method.

U.S. Patent Application Publication No. 2002/0059093 to Barton et al. teaches methods and systems for compliance program assessment.

U.S. Patent No. 5,546,321 to Chang et al. teaches a method and apparatus for the cross-sectional design of multi-layer printed circuit boards.

U.S. Patent No. 5,433,245 to Prather et al. teaches an online valve diagnostic monitoring system having diagnostic couplings including means for comparing similar operational units in different plants to identify generic problems with units in particular applications or from a particular manufacturer.

U.S. Patent No. 6,434,458 to Laguer-Diaz et al. teaches a method and apparatus for vehicle data transfer optimization including a well-known system for analyzing data patterns or fault occurrences with respect to the operation of other similar devices under monitoring in order to determine if preventive maintenance is needed on a current device under monitoring to prevent the occurrence of a line-of-service breakdowns since a fault in one device will more than likely occur in another similar device undergoing the same wear/usage.

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10. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jeffrey R. West whose telephone number is (571)272-2226. The examiner can normally be reached on Monday through Friday, 8:00-4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Marc S. Hoff can be reached on (571)272-2216. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

jrw  
April 28, 2005



**PATRICK ASSOUD**  
**PRIMARY EXAMINER**